corresponding scan point on the film. When the projector reaches the same point, the relay K_7 is operated as before described and it in turn drops the relay K_9. (Note that both relay K_7 and K_{12} must be operated to drop the relay K_9.) As the relay K_9 is dropped, the switch *d* lower contact is closed to feed a pulse from the plus terminal **80** via the lead **117** to operate the relay K_{90} momentarily. This feeds a pulse from the plus terminal **91** to the frame advance solenoid **67** to advance the film by one frame.

Each lesson presented to the pupil—which may comprise a series of separate visual items and of corresponding audio messages—may be repeated regardless of how far the student has progressed therethrough if (1) the pupil takes too long to respond, or (2) makes too many mistakes. For instance, when any of the modes controlled by lines **34** to **39** is activated, it starts also a lesson repeat timer **118**. If the lesson repeat switch **119** is closed a relay K_{20} is operated after a predetermined interval via a lead **120**. Operation of the relay K_{20} closes its switch *b* to operate also relay K_9 causing both relays K_{20} and K_9 to lock over switch *b* of relay K_7 and switch *a* of relay K_{12}. Operation of relay K_{20} closes a rewind circuit **121** of the projector **11** via switch *a* upper contact of relay K_{20}, lead **101**, switch *a* upper contact of relay K_7, switch *b* of relay K_9 and the hold circuit of relay K_9. The projector runs in reverse until the previously detected special code is again detected to operate the relay K_7.

The operation of relay K_{20} by the lesson repeat timer closes its switch *e* upper contact to also activate a rewind circuit **122** of the audio machine M_1 via lead **105**, switch *b* lower contact of relay K_{12}, lead **106**, switch *d* upper contact of relay K_{12} and plus terminal **80**. When during the rewinding the audio machine picks up the first scan control signal marking the start of the lesson in progress, the relay K_{10} is operated via the detector **109**, lead **110** and switch *e* of relay K_9. Operation of the relay K_{10} now operates the relay K_{12} because the relay K_{20} is standing operated from plus terminal **100** via switch *a* of relay K_{10}, switch *d* of relay K_{20} and lead **123**. When the relay K_{12} is operated it locks over its switch *b* upper contact, switch *d* of upper contact K_9 and plus terminal **80**. Operation of relay K_{12} opens its switch *b* lower contact to stop the rewind of the audio machine.

When both relays K_7 and K_{12} are operated, the relays K_9 and K_{20} are dropped. As the relay K_9 is dropped it sends a pulse via switch *b* lower contact to advance the projector by one frame. As the relay K_{20} is dropped, its switch *a* is closed to activate the playback circuit **45** of the audio machine M_1. The machine is therefore ready to make a repeat presentation of the audio part of the lesson.

The same repeat sequence takes place if the pupil makes too many mistakes. For example, as the pupil touches the pointer **27** to each wrong conductor segment **23**, the minimum current the photocells **28** are passing will activate a detector **124** and trigger a preset error counter **125** as well as a total error counter **126**. When the preset number of errors is reached, and if the error switch **127** is closed, the relay K_{20} is operated via line **120** to start the lesson repeat sequence as above described. The preset error counter **125** is reset by switch *b* of relay K_1 each time the relay K_1 is operated responsive to touching the pointer **27** to a correct segment **23**. The total error counter **126** is reset by pressing a button **128**. The opening of switch **127** turns off the error counter.

The embodiment of my invention herein particularly shown and described is intended to be illustrative and not necessarily limitative of my invention, since the same is subject to changes and modifications without departure from the scope of my invention, which I endeavor to express according to the following claims.

I claim:

1. In a teaching machine: the combination of a pupil's information screen, a supply of picture frames bearing items of instruction, a projector selectively operable for showing respective items of instruction onto said screen by projecting an individual frame for still viewing or by projecting a series of frames in a motion picture run, a frame for each item of instruction having a code area for projecting coded light signals according to a binary code, an audio machine having a prerecorded medium for playing audio messages related to selected items of instruction shown by said projector, a pupil's response device selectively operable to make a predetermined choice relative to the respective items of instruction shown by said projector, and conditioning means controlled by the coded light signals and operatively connected to said audio machine and said projector for controlling the starting of said audio machine and the timing of the starting thereof relative to the pupil's operation of said response means and for concurrently conditioning said projector for still showing of an individual frame or for showing a series of frames in a motion picture run.

2. The teaching machine set forth in claim **1** wherein said conditioning means is placeable in a condition for causing said audio machine to be activated to provide an audio message simultaneously as an item of instruction is projected onto said information screen, means for repeating the audio message related to the item of instruction shown, and timing means for activating said repeating means when the pupil delays by more than a predetermined interval in making said choice.

3. The teaching machine set forth in claim **2** wherein said conditioning means is selectively operable by said coded light signals to activate the audio machine before a pupil's response with or without operation of said repeating means if the pupil delays said predetermined interval in making said choice.

4. The teaching machine set forth in claim **1** wherein said conditioning means includes means selectively operated according to said code signals when a new item of instruction is projected on said screen, (1) to leave said audio machine in idle condition, (2) to start said audio machine as said item is projected, or (3) to start said audio machine responsive to the operation of said pupil's response means.

5. In a teaching machine: the combination of a pupil information screen, a supply of picture frames bearing items of instruction, a projector for projecting said items of instruction from said frames onto said screen, said frames having code areas for projecting coded light signals according to a binary code, a pupil's response screen on the back face of which background information is projected by said projector from said frames to provide a choice to the pupil for each item of instruction shown, said response screen being provided on the top face thereof with a pattern of transparent conductive areas in predetermined spatial relation to said background information, a manual conductive pointer to be touched to said pupil's response screen in making said choice, means responsive to said coded light signals when a frame is being shown for activating a conductive area overlying said choice, and circuit means responsive to a pupil touching said pointer to an activated conductive area for starting said projector to show a next successive item of instruction.

6. In a teaching machine system for presenting successive items of a set course of instruction upon the pupil making a predetermined choice as to each item: the combination of a pupils' information screen, a supply of picture frames representing said successive items of instruction, a projector operable in different modes for showing a frame for still viewing or a series of frames in a motion picture run, an audio machine having a prerecorded record medium for playing audio messages relating to selected items of instruction, a pupil's response means for activating said projector to make the next successive presentation only when the pupil has made said predetermined choice, and code means on said picture frames for providing code signals to determine said mode of opera-